IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

Inventor(s):   Yedidia et al.

Title: QUANTIZING SINGALS USING SPARSE GENERATOR FACTOR
GRAPH CODES

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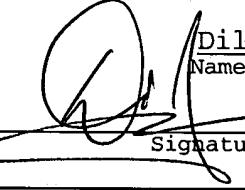
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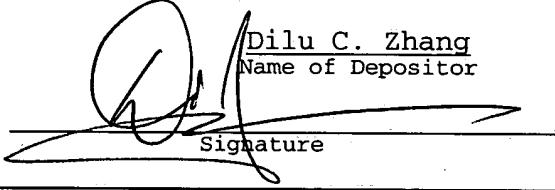
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* * *

INFORMATION DISCLOSURE STATEMENT

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Pursuant to 37 C.F.R. §1.56(a), Applicant hereby cites the
following documents (copies enclosed) listed on the attached copy
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PLG 2/93
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1

This Information Disclosure Statement is filed in accordance with the paragraph of 37 CFR §1.97 checked below:

  X   1.97(b) This Information Disclosure Statement is filed:

       (1)   Within three months of the filing date of a national application; OR

       (2)   Within three months of the date of entry of the national stage of an international application; OR

       (3)   Before the mailing of a first Office Action on the merits.

    No fee or certification is required.

  __ 1.97(c) This Information Disclosure Statement is filed after the period specified in paragraph (b) above, but before the mailing date of either:

       (1) A Final Action under 37 CFR 1.113; OR

       (2) A Notice of Allowance under 37 CFR 1.311;

AND is accompanied by either:
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_____ the Certification under 37 CFR 1.97(e) as set out below; OR

_____ the fee of $240.00 under 37 CFR 1.17(p).

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BUT before payment of the Issue Fee, AND is accompanied by:

(1) the Certification under 37 CFR 1.97(e) as set out below; AND

(2) Petition is hereby made under 37 CFR 1.97(d) for consideration of this Information Disclosure Statement; AND,

(3) Authorization to charge the petition fee of $130.00 as set out in 37 CFR 1.17(i).

If this Information Disclosure Statement is being filed under 37 CFR 1.97(c) or 1.97(d), the undersigned Attorney hereby

certifies that:

    __   each item of information contained in this Information Disclosure Statement was cited in a communication from a foreign patent office in a counterpart foreign application not more than three months prior to the filing date of this Statement;

or

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Authorization is hereby given to charge the indicated fee(s) to Deposit Account No. 50-0749.

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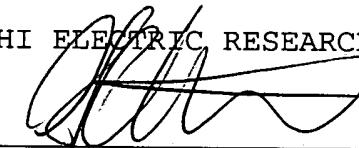
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Enclosures

Form PTO-1449 (modified 2/91)	U.S. DEPT OF COMMERCE Patent and Trademark Office	Attorney Docket Number: MERL-1507	Serial Number:
INFORMATION DISCLOSURE CITATION (Use several sheets if necessary)		Applicant: Yedidia et al.	
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U.S. PATENT DOCUMENTS

Exam- iner Initial	Patent number	Date	Name	Class	Subclass	Filing date if appropriate

FOREIGN PATENT DOCUMENTS

	Document number	Date	Country	Class	Subclass	Translation	
						YES	NO

OTHER DOCUMENTS (Including Author, Title, Date, Pertinent Pages, Etc.)

1.	R. Gray and D. Neuhoff, "*Quantization,*" IEEE Transactions on Information Theory, vol. 44, pp. 2325-2383, October 1998.
2.	"*A Mathematical Theory of Communication,*" Bell Syst. Tech. Journal, vol 27, pp. 379-423, 623-656, 1948.
3.	P. Oswald and A. Shokrollahi, "*Capacity-achieving Sequences for the Erasure Channel,*" IEEE Transactions on Information Theory, vol. 48, pp. 3017-3028, December 2002.
4.	F.R. Kschischang, B.J. Frey, and H.-A. Loeliger, "*Factor Graphs and the Sum-Product Algorithm,*" IEEE Transactions on Information Theory, vol. 47, pp. 498-519, February 2001.
5.	J. S. Yedidia, J. Chen, and M. Fossorier, "*Representing Codes for Belief Propagation Decoding,*" Proceedings of the International Symposium on Information Theory, p. 176, 2003.
6.	J.S. Yedidia, W.T. Freeman, and Y. Weiss, "*Constructing Free Energy Approximations and Generalized Belief Propagation Algorithms,*" Mitsubishi Electric Research Laboratories, TR2002-35, August 2002.

Examiner:	Date Considered:

EXAMINER: Initial if citation considered, whether or not citation is in conformance with MPEP .609; Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to the applicant.